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(71) Applicant: Maxygen, Inc.  
Santa Clara, CA 95051 (US)

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(72) Inventors:

- Stemmer, Willem P.C.  
Los Gatos, CA 95030 (US)
- Cramer, Andreas  
Mountain View, CA 94040 (US)

(74) Representative: Irvine, Jonquil Claire  
J.A. KEMP & CO.  
14 South Square  
Gray's Inn  
London WC1R 5LX (GB)

(54) **Methods for generating polynucleotides having desired characteristics by iterative selective and recombination**

(57) The present invention relates to a method for evolving a polynucleotide encoding a plurality of genes, e.g. multiple genes forming a multicomponent pathway. The method involves shuffling of polynucleotides by conducting a polynucleotide amplification process on overlapping segments of a population of variants of a polynucleotide encoding a plurality of genes under conditions whereby one segment serves as a template for extension of another segment to generate a population of recombinant polynucleotides. This population is screened for a recombinant polynucleotide encoding a plurality of genes having a desired property.

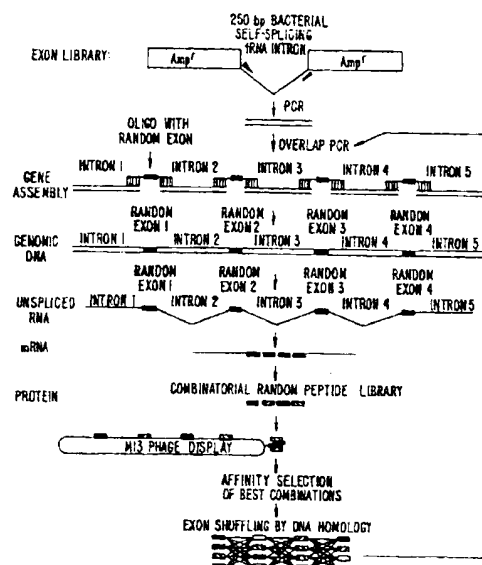


FIG. 20.

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## EUROPEAN SEARCH REPORT

Application Number  
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The present search report has been drawn up for all claims			
Place of search THE HAGUE		Date of completion of the search 4 March 1999	Examiner Hornig, H
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